ABSTRACT

A high-density composite material and its use in the manufacture of less-lethal ammunition projectile is disclosed. The composite ammunition projectile material is produced from a compact mixture of fine iron powder, a highly damping, inert, non-toxic elastomer and an inert non-toxic thermoplastic elastomer. The composite ammunition projectile material is first blended, then the projectile is injection molded or compression molded. The density of the composite ammunition projectile material is adjustable in terms of ratio of iron powder to elastomer to thermoplastic elastomer block co-polymer, but a minimum density of 2.4 gcm⁻³ is preferred. A blend comprising an elastomer and a thermoplastic elastomer with low creep is also disclosed.